



April 27, 1994

Mr. Tom Howard
Senior Water Resources Control Engineer
Division of Water Rights
State Water Resources Control Board
P.O. Box 2000
Sacramento, California 95812-2000

Dear Tom:

Please find enclosed the comments of the Northern California Water Association regarding the Environmental Protection Agency's Proposed Water Quality Standards.

Please call me if you would like any further information.

Sincerely,

A handwritten signature in cursive script that reads "Richard Golb". The signature is written in dark ink and is positioned above the printed name and title.

Richard Golb
Executive Director

Senator Hotel Office Building
1121 L Street, Suite 904
Sacramento, California 95814
916/442-8333 FAX: 916/442-4035



March 10, 1994

Mr. Patrick Wright
Bay/Delta Program Manager
Water Quality Standards Branch
W-3, Water Management Division
Environmental Protection Agency
75 Hawthorne Street
San Francisco, California 94105

Dear Mr. Wright:

Enclosed please find comments from the Northern California Water Association in behalf of our members on the Environmental Protection Agency's proposed water quality standards for the Sacramento-San Joaquin River Delta and San Francisco Bay.

I would be pleased to discuss our comments with you either in San Francisco or Sacramento at your convenience. We may also submit additional comments to you in the next several days. I would appreciate if our additional comments could be included with the enclosed comments dated March 10.

I look forward to talking with you soon.

Sincerely,

Richard K. Golb
Executive Director



March 10, 1994

FEDERAL EXPRESS

Mr. Patrick Wright
Bay/Delta Program Manager
Water Quality Standards Branch
W-3, Water Management Division
Environmental Protection Agency
75 Hawthorne Street
San Francisco, CA 94105

Re: Northern California Water Association's Comments on
Proposed Water Quality Standards for Surface Waters of the
Sacramento River, San Joaquin River, and San Francisco Bay
and Delta of the State of California

Dear Mr. Wright:

The Delta is the heart of California's water supply system. It receives run-off from over forty percent of the State's land area, including flows from the Sacramento, San Joaquin, Mokelumne, Cosumnes and Calaveras rivers. Furthermore, two-thirds of the State's population receives water from the Delta.

The Northern California Water Association (NCWA) is a non-profit organization founded in 1992 for the purpose of protecting the water rights and the water supply of the Sacramento Valley. NCWA represents 24 public and private water districts, agencies and water companies, as well as 23 individual farmers. It includes almost 400,000 irrigated acres of farmland in the Sacramento Valley. Rice is a major crop grown by members of NCWA.

NCWA and its member agencies may be affected by the water quality standards proposed by EPA. The proposed water quality standards will significantly change the operations of the numerous water projects within California, including the Central Valley Project and the State Water Project. These changes in operations, particularly any potential limitations on diversions, will have a dramatic effect on Northern California interests.

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A major premise upon which both the Central Valley Project and the State Water Project were constructed is that no water would be diverted from the area of origin which is now or may ever be required for beneficial use. To the extent that the proposed water quality standards influence the availability of water to the federal project, it is critical that the protections given by the county of origin and watershed protection statutes be honored and preserved. To do otherwise is to jeopardize the economic viability of the communities served by member agencies of NCWA. These comments are submitted, therefore, on behalf of NCWA and its member agencies.

I.

EPA SHOULD DELAY FINAL PROMULGATION OF THE
PROPOSED RULES IN ORDER TO ALLOW THE STATE TO PROPERLY
EXERCISE ITS AUTHORITY UNDER THE CWA

Congress has traditionally deferred to the states in both the management and protection of the nation's water resources. In enacting the Clean Water Act (CWA), Congress continued to recognize the States' primary responsibility for the administration of a water pollution program. Section 101 (b) expressly states that "[i]t is the policy of the Congress to recognize, preserve, and protect the primary responsibilities and rights of States to prevent, reduce, and eliminate pollution, [and] to plan the development and use (including restoration, preservation, and enhancement) of land and water resources. . . ."

Consistent with that policy objective, Congress confirmed that the States should have the lead authority in establishing water quality standards pursuant to Section 303 of the Clean Water Act. The State of California, through the Governor's Water Policy Council, has announced in public statements to the EPA that State Water Resources Control Board (SWRCB) will begin in April, 1994, a triennial review of the 1991 Water Quality Control Plan for Salinity for San Francisco Bay/Sacramento-San Joaquin Delta Estuary. As part of that triennial review, the SWRCB will be examining whether or not the present standards are adequate to protect beneficial uses of the Delta. Given that it is the State, not EPA, who is principally responsible for establishing water quality standards, EPA should delay the final promulgation of the proposed rule, thus allowing the State to assume its rightful role under the Clean Water Act in determining appropriate levels of water quality protection.

II.

EPA DOES NOT HAVE AUTHORITY TO ADOPT THE
PROPOSED WATER QUALITY STANDARDS.

A. Promulgation of the Proposed Standard Will Violate
Section 101(g) of the Clean Water Act

To achieve the water quality standards proposed by EPA to protect estuarine habitat conditions, it will be necessary to require additional freshwater flows into the Delta. These additional flows can only be made available through the release of stored water and/or by a limitation on diversions.

At EPA's request, the California Department of Water Resources (DWR) has analyzed the impact these proposed standards will have on the available water supply. In comparison with Decision 1485, DWR has estimated that the proposed EPA standards will result in a reduction of water supplies from the Delta by as much as 1.1 million acre-feet, on average over the 71 years of hydrologic record. In critically dry years, the water supply impacts could be as high as 3.1 million acre-feet.

Section 101(g) of the Clean Water Act specifically states:

It is the policy of Congress that the authority of each State to allocate water within its jurisdiction shall not be superseded, abrogated or otherwise impaired by this Act. It is further the policy of Congress that nothing in this Act shall be construed to supersede or abrogate rights to quantities of water which have been established by any State.

In accordance with the mandate of Section 101(g), EPA admits that it does not have the authority to implement the proposed water quality standards since the standards can only be met if current water rights are superseded by water quality requirements. It, therefore, expects that the proposed criteria will be implemented by the SWRCB through its authority under State law to revise existing water rights. 59 Fed. Reg. 813.

By promulgating standards that can only be met by modifying existing water rights, EPA will have essentially robbed the State of its own discretion

and ability under State law to protect water quality while also taking into account other competing beneficial uses of water, including water supply. EPA will have directly impaired the State's authority to allocate water within its jurisdiction, contrary to the express language of 101(g).

B. The Proposed Water Quality Standards Are Surrogates for Flow and Not within EPA's Jurisdiction to Regulate

Although EPA states that it is refraining from proposing flow criteria, the salinity standards proposed for the protection of the estuarine habitat and the salmon smolt survival index are nothing more than surrogates for the allocation of additional freshwater outflow and thus, are not appropriate water quality standards under Section 303(c) of the Clean Water Act. Water quality standards consist of two elements: (1) designated uses and (2) water quality criteria. EPA's regulations define water quality criteria as elements of water quality standards that are expressed "as constituent concentrations, levels, or narrative statements representing a quality of water." 40 C.F.R. § 131.1(b). Furthermore, the criteria is to be based on the "relationship that the effect of a constituent concentration has on particular aquatic species and/or human health." 40 C.F.R. § 131.1(c).

EPA's authority under the Clean Water Act to establish water quality criteria is limited to "water quality issues" such as establishing appropriate concentrations of chemicals in water, i.e. chloride, aluminum, mercury. It is inappropriate for EPA to include as a water quality criteria such hydrodynamic processes such as water depth, velocity, or flow.

The 2 ppt¹ isohaline standard was selected by EPA because it serves as an index for other estuarine properties and processes that cannot be easily measured. In fact, the underlying correlations upon which the 2 ppt isohaline standard are based, were done by the Department of Fish and Game to compare fish abundance to outflow. No cause and effect relationship has ever been developed by EPA or the fishery agencies between fish abundance and salinity.

EPA has done little, or nothing, to determine the actual cause of the decline in delta fisheries populations or to attempt to address the causes directly. It has simply assumed that if the delta outflow is used to move the X-2 standard within the Suisun Bay, it will increase the level of protection for estuarine species. While the criteria is shrouded in correlations between salinity and abundance and distribution of many estuarine species, it is

¹ The 2 ppt isohaline standard is also referred to as the X-2 standard. Both terms are used throughout these comments in reference to the Estuary Habitat Criteria.

essentially a shotgun approach wherein water is thrown at a "problem" in hopes that it will result in an increase in population of the delta fisheries.

The Salmon Smolt Survival Indices used to establish the fish migration and cold fresh-water habitat also fail to encompass water quality parameters properly regulated under Section 303(c). The survival indices for both the Sacramento River and San Joaquin River, as used by EPA, ignore the contribution made by water temperatures to survival and, instead, attempt to regulate survival only through the manipulation of river flows and limitations on exports. Since these are the only variables being regulated, the Salmon Smolt Survival Indices cannot be employed by EPA as proper water quality criteria.

C. Salinity Intrusion Is Not Appropriately Regulated Pursuant to Section 303 of the CWA, but Rather Is Subject to Regulation Under Section 208

To the extent that EPA is attempting to regulate salinity in the Delta and the Bay, it is not the addition of salinity to the water from point sources or non-point sources that EPA is seeking to control. To the contrary, it is the natural process of salinity intrusion, as affected by diversions of water upstream of the Delta. EPA does not have authority under Section 303 of the Clean Water Act to regulate or establish standards to control the level of salinity intrusion.

The process and procedures for regulating salinity intrusion are vested entirely with the State pursuant to Section 208 of the Clean Water Act. According to Section 208, the State is directed to prepare areawide waste treatment management plans, which may include, if appropriate, "a process to identify . . . salt water intrusion into . . . estuaries resulting from reduction of fresh water flow from any cause." The plan should also set forth procedures "to control such intrusion to the extent feasible where such procedures and methods are otherwise a part of the waste treatment management plan."

Unlike Section 303(c), Section 208 does not authorize EPA to promulgate its own areawide waste treatment management plan. If the State fails to properly administer a program under Section 208, EPA is only authorized to withdraw its prior approval of the State's program. EPA cannot skirt the limitations in its authority under Section 208 by attempting to regulate salinity intrusion through the development of water quality standards.

III.

EPA HAS IMPROPERLY DEVELOPED THE
PROPOSED WATER QUALITY STANDARDS

A. Beneficial Uses under California's Porter-Cologne Water Quality Control Act and Designated Uses under the Clean Water Act Are Not Synonymous

As previously noted, water quality standards under the Clean Water Act consist of designated uses and water quality criteria. In developing the proposed water quality standards, EPA has adopted as "designated uses" under the Clean Water Act, the "beneficial uses" of water established by the State. By simply adopting California's "beneficial uses" for the Delta and Bay, EPA has failed to comply with the necessary requirements of the Clean Water Act.

Section 303(c)(2)(A) of the Clean Water Act requires that water quality standards be established taking into account the involved water's "use and value for public water supplies, propagation of fish and wildlife, recreational purposes, and agricultural, industrial, and other purposes" This section has been construed to require consideration of economic factors only in determining designated uses. *Mississippi Comm. on Natural Resources v. Costle*, 625 F.2d 1269, 1277 (5th Cir. 1980).

California's beneficial use determination does not, however, require the same analysis of economic factors as the Clean Water Act. To the contrary, according to the provisions of California's Porter-Cologne Water Quality Control Act, economic factors are considered in the establishment of water quality objectives. Water Code Section 13241 expressly states:

Factors to be considered by a regional board in establishing water quality objectives shall include, but not necessarily be limited to, all of the following:

- (a) Past, present and probably future beneficial uses of water.
- (b) Environmental characteristics of the hydrographic unit under consideration, including the quality of water available thereto.
- (c) Water quality conditions that could reasonably be achieved through the coordinated control of all factors which affect water quality in the area.

- (d) Economic considerations.
- (e) The need for developing housing within the region.
- (f) The need to develop and use recycled water.

Because of the different analysis required by state and federal law, it is improper to consider the terms "beneficial use" and "designated use" as being synonymous. By simply adopting California's determination of beneficial uses, EPA has failed to properly take into consideration "the value and use" of the waters of the Delta and the Bay for public water supply, agriculture, and industrial purposes in developing the proposed water quality standards as required by the Clean Water Act.

B. EPA's Proposed Water Quality Criteria Is Not Based upon Sound Scientific Rationale

Water quality criteria "must be based on sound scientific rationale." 40 CFR § 131.11(a). Furthermore, in situations where there are multiple uses of water the "criteria shall support the most sensitive use." *Id.* The proposed water quality criteria fails to meet these requirements.

1. EPA's Proposed Estuarine Standard Is Not Scientifically Justified

EPA's proposed estuarine habitat standard is based upon the location of X-2 at certain specified locations for a specified number of days. However, as demonstrated by Contra Costa Water District, EPA used an inappropriate conversion between measurements of surface electrical conductivity and practical salinity to develop the standard. EPA's proposed standard is more like a X-1.5 standard than X-2. If properly computed as an X-2 standard, the number of days set forth in EPA's proposed criteria would be reduced.

In addition to having made an error in the conversion, there are a number of technical questions that must be raised regarding the level of protection EPA is seeking to provide. EPA has targeted the late 1960s to the early 1970s as providing suitable habitat conditions for the estuary. Thus, the proposed standards are intended to recreate or mimic those historic conditions.

To determine the standards necessary to recreate those historic conditions, EPA used the hydrologic period 1940-1975. According to EPA, this period was selected because of its representative hydrologic conditions; making it a better indicator through all water year types of the habitat conditions EPA is

seeking to recreate. EPA's assumption that the 1940-1975 period is characteristic of historical precipitation and run-off is, however, incorrect. The period between 1940-1975 does not include any critically dry years. It deletes the historic dry period of 1928-1934, as well as the severe drought of 1976-1977 and the extended drought of 1987-1992.

In addition, EPA has incorrectly assumed that 1940-1975 was a period of relatively minor development in the Central Valley. Information made available from the DWR demonstrates, however, that during the 1940-1975 there occurred significant increases in both reservoir capacity and irrigated agriculture. Thus, EPA's choice of 1945-1975 to represent the conditions of the late 1960s - early 1970s is insupportable and therefore, arbitrary and capricious.

EPA exacerbates the errors in its analysis by using an average to determine the number of days that X-2 would have occurred at various locations during different water year types. An average of the number of days X-2 was at a certain location over an extended period of time cannot be reasonably relied upon as an accurate reflection of conditions that occurred in the estuary during the late 1960s - early 1970s. The fact that EPA has also used such an arbitrary hydrologic period to determine that average makes the proposed standard even more meaningless.

To identify the water year type in developing the proposed standards, EPA used the Sacramento River (40-30-30) Index. This index is an appropriate representation of water availability for a full water year. It is not, however, appropriate for use in determining standards directed at improving estuary conditions for the period February through June for different water year types.

The Sacramento River (40-30-30) Index combines forecasted run-off in the April through July period; the index of the previous year; and run-off in the October through March period. As indicated by Sullivan and Denton (Contra Costa Water District) July runoff and unstored October through December runoff are unlikely to affect salinity in the period February through June. A February-June Sacramento Four River Index is more appropriate since this is the period that most directly affects salinity in the Delta and Suisun Bay. Even using the February - June Sacramento Four River Index, there are, however, other variables that have historically influenced the location of X2 which are not being taken into account by EPA.

As a result of the approach used by EPA there is no credible way in which to measure the success or failure of the standard. Because of the number of variables involved in the development of the standard, no monitoring

requirement can ascertain which element has resulted in a change, if any, in fish populations. If fish populations levels do not increase as a result of implementation of this standard, it is because the important biological factors have not been properly identified or is simply because the historic period has not been adequate recreated?

2. Use of the Salmon Smolt Survival Index as a Water Quality Criteria Is Not Scientifically Justifiable

In developing the fish migration and cold water habitat criteria, EPA relies, in part, upon the salmon smolt survival indices for the Sacramento River. This index was derived from smolt survival models developed by the Fish and Wildlife Service to evaluate relationships between survival and different environmental factors. Because data used in the models were primarily from dry and critically dry years, the models' results could change quantitatively and qualitatively when a wider range of hydrologic conditions are used. Thus, use of the model by EPA to predict survival under conditions other than those upon which the model was developed is inappropriate.

The Sacramento River Smolt Survival Index is heavily dependent upon water temperatures², which EPA admits are difficult to manage and predict. Unexpected water temperature fluctuations can change calculated survival sufficiently that the criterion proposed by EPA cannot be met even with the closure of the Delta Cross Channel³ and curtailment of state and federal project diversions. To meet the criteria under such circumstances, large reservoir releases would be required during April, May and June, resulting in an impact on carry-over storage required to meet winter-run chinook salmon temperature obligations during the summer following the fall period of adult fall-run immigration and spawning.

Another deficiency in the model relates to accuracy of the survival estimates and how these estimates are manipulated for use in the regressions

² Questions have been raised regarding whether or not the regression model overestimates the importance of water temperature in determining smolt survival. The analysis uses a correlation between variation in smolt survival and variation in Freeport water temperatures. There has, however, been no cause and effect relationship demonstrated between survival and temperatures at Freeport. Thus, to the extent that the model overestimates the effect of water temperatures, the benefits projected by the model from large releases of water to meet the criteria, may not actually occur.

³ At this time the percentage of smolts entering the central Delta from the Sacramento River is uncertain. Consequently, the benefits of closing the Cross Channel gates and Georgiana Slough cannot be accurately quantified at this time.

Mr. Patrick Wright

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from which the smolt survival is derived. According to information from Fish and Wildlife Service (Table 4-1 of Exhibit 31 to the 1987 SWRCB Bay/Delta hearings and Appendix 9 of Sacramento-San Joaquin Estuary Fishery Resource Office 1991 annual Progress Report) smolt survival estimates exceed 100% for various coded wire tagged groups. Survival of 100% is biologically impossible.

To address this problem, Fish and Wildlife Service divides all survival estimates by a factor of 1.8 which represents the highest ration of upstream released recoveries to downstream released recoveries found to date. This correction reduces all estimates of smolt survival by approximately 55% before the data is used to develop the regression relationships which are the basis for EPA's proposed standards. Such corrections in the data may be appropriate when the model is used to compare the relative changes in smolt survival of different water management practices. It is not appropriate, however, when the smolt survival estimates are being used to establish a mandated water quality criteria.

The San Joaquin River Salmon Smolt Survival Index, which is also used by EPA to develop the fish migration and cold water habitat criteria, was derived from experiments conducted by U.S. Fish and Wildlife Service to evaluate the potential benefits to migrating smolts of installing a fish barrier at the head of Old River. Survival of coded wire tagged smolts, released at Dos Reis, downstream from the confluence of the San Joaquin River and upper Old River, was used to estimate the benefits of installing a barrier at the upper Old River.

The model was developed on the basis of only eight data points. Consequently, the results of the model represent a very limited range of environmental conditions.

There are a number of other factors which also calls into question EPA's use of both salmon smolt survival indices as a basis for developing a water quality criteria. First, the confidence intervals for the survival estimates are unacceptable when used to determine a water quality parameter. In some cases, the confidence intervals exceed 43% of the point estimate. When expanded to the scientific standard of 95% (1.96 standard deviations) the interval estimates are as much as 86% of the point estimate.

Second, the difference in water temperature between hatchery truck and the receiving water has been shown to be a significant contributing factor to the survival of released smolts. This temperature differential was not, however,

taken into account in estimating salmon smolt survival in the development of the model.

Third, the assumptions made regarding the probability of capture of smolts migrating past Chipps Island are not supported. Fish and Wildlife Service assumes that approximately 90% of the smolt released are subject to capture. Furthermore, the probability of capture is assumed to be the same for the daylight and night-time hours. Data from other river systems indicates, however, that the assumption is incorrect.

While these deficiencies in the model may be of minor consequence when comparing the relative benefits of a change in project operations, they are significant when the models are used to develop a mandated target survival value. It is a misapplication of the models.

3. EPA's Proposed Water Quality Standards Do Not Properly Take into Account the Most Sensitive Species

As previously noted, EPA's regulations require that the water quality criteria support the most sensitive of the designated uses. 40 C.F.R. § 131.11. In the case of the Delta and Bay, winter-run salmon must be considered the most sensitive use, having been listed as endangered pursuant to the Endangered Species Act. It is not apparent from the proposed rule that EPA has properly taken into account the potential adverse impacts on winter-run salmon resulting from each of the proposed criteria.

The X-2 standard at Roe Island will, in many years, require enormous releases of freshwater from upstream reservoirs during the February - June period. According to the analysis done by the Department of Water Resources, the average reduction in carryover storage is 900,000 acre-feet per year. This loss in carryover storage will undoubtedly impair the Bureau of Reclamation's ability to meet temperature objectives as required in the biological opinion for winter-run salmon.

The fish migration and cold water habitat criteria will also result in an adverse impact on carryover storage. The fish migration and cold water habitat criteria was developed using fall-run salmon only. Accordingly, the criteria developed applies only to April, May, and June. Because the criteria may not be met through changes in project operations, i.e., closure of the cross channel gates, curtailment in pumping, additional releases of stored water will be necessary. As in the case of the Roe Island standard, these releases in water will

affect Reclamation's ability to meet temperature objectives for winter-run salmon.

Predation by striped bass is a major factor affecting the survival of winter-run salmon. There is no indication in the proposed rule that EPA took this conflict between species into account in the development of the fish spawning criteria.

4. The Proposed Water Quality Standards Violate EPA's Antidegradation Policy

The water quality standards proposed by EPA must be consistent with its regulations on antidegradation. EPA's antidegradation policy requires that existing uses be maintained and protected. 40 C.F.R. § 131.12. Existing uses are further defined as uses that existed on or after November 28, 1975. 40 C.F.R. § 131.3.

Analysis prepared and submitted by the SWRCB calls into question the consistency of the proposed water quality standards with EPA's antidegradation policy. In examining the estuary habitat criteria, the SWRCB concluded that the proposed standard will typically require X-2 to be met one to two months more at each of the three locations than actually occurred historically during the mid-seventies. Similarly, the SWRCB's analysis of the fish migration and cold water habitat also demonstrates that the proposed standards exceed the period of time in which the antidegradation policy was established to protect.

Not only does the proposed fish spawning criteria exceed the requirements of EPA's antidegradation policy, it is also unlikely that the proposed standard will affect the adult striped bass population. The elevated salinity in the San Joaquin River, which the proposed fish spawning criteria is intended to address, became significant in the 1950's. Thus, the salinity problem in the San Joaquin River predates the decline in the striped bass population.

C. Regulatory Impact Analysis Under Estimates the Economic Impacts Associated with the Proposed Water Quality Standards

The President in issuing Executive Order 12866 specifically stated that the American people deserve a regulatory system that, in part, "improves the performance of economy without imposing unacceptable or unreasonable costs on society." To ensure that goal, the Executive Order requires an agency to "assess all costs and benefits of available alternatives, including the alternative

of not regulating." No regulation should be adopted without a "reasoned determination that the benefits of the intended regulation justify its costs." Furthermore, the regulations should be tailored "to impose the least burden on society. . . taking into account. . . the cost of cumulative regulations." The Draft Regulatory Impact Assessment of the Proposed Water Quality Standards for the San Francisco Bay/Delta and Critical Habitat Requirements for the Delta Smelt fails to provide a "reasoned determination" as required by the President's Executive Order.

The economic analysis prepared to evaluate the costs associated with the reduction in water supply that will result from implementation of the proposed standards grossly underestimates their real economic effect. Assumptions made by EPA regarding farmers' ability to shift crops; that low value crops will be the only crops affected by the proposed regulation; and that water transfers will reduce the economic impact oversimplifies the actual opportunities available to farmers to reduce the economic impacts associated with the proposed regulation.

Cropping changes were analyzed using the California Agricultural Resources Management model. This model allows for too much flexibility in cropping decisions. It does not include constraints resulting from the permanency/years to bearing for perennial crops, the ability to find markets for products or governmental support program provisions. In addition, the model may not accurately reflect changes in crop prices due to cropping shifts to high value, specialty crops. Furthermore, the model may not accurately reflect changes in costs of dairy and beef production attributable to large reductions in pasture and hay acreage. Finally, the model was run without taking account inevitable changes in the use of groundwater.

Although cropping changes may provide some mitigation for the economic impacts associated with implementation of the proposed standards, there are certain risks associated with these shifts to high value crops. For instance, there are higher production and marketing risks associated with the higher value crops. In addition, bankers may not be willing to lend money for such plantings given the reduction in reliability of water supplies.

To present a more realistic view of the economic costs associated with the proposed water quality standards, the assessment should have taken into account the differences in regional and farm-level adjustments to water shortage; the effects of water shortage on a wide range of agricultural crops; the costs of obtaining alternative water supplies; the limits to potential water

markets and water trades; and the effects of the increased frequency of shortages.

IV.

MODIFICATIONS TO THE PROPOSED WATER
QUALITY STANDARDS SHOULD BE IMPLEMENTED
TO REDUCE THE IMPACT ON THE AVAILABLE WATER SUPPLY

In its Questions & Answers on: Antidegradation, EPA specifically states that under Section 101(g) of the Clean Water Act, EPA has obligation to try to reconcile water quality needs with state water quantity allocations. Accordingly, EPA is required to determine whether or not alternatives exist that will be less disruptive to water quantity allocations. This view is further supported by the President's Executive Order. It specifically states that "[e]ach agency shall design its regulations in the most cost-effective manner to achieve the regulatory objective."

While the most effective manner to avoid conflict with existing rights to water is to allow the State to proceed with its Triennial Review, EPA, at a minimum, should consider modifications recommended to reduce the impact on the available water supply. NCWA generally supports the modifications to the proposed standards suggested by the California Urban Water Agencies. NCWA also urges EPA to implement the three proposed modifications to the X-2 standards contained in the *Report on Clean Water Act X2 Water Quality Standards* dated February 1994 by Sullivan and Denton, Contra Costa Water District. The proposals of both CUWA and CCWD include recommendations to:

1. use of full record of DAYFLOW to provide a better estimate of the hydrological and ecological conditions in the estuary in the late 60's and 70's;
2. modify the Sacramento River Index for the purposes of developing the salinity criteria by using the February-June Sacramento Fourth River Index; and
3. set water quality criteria based on a continuous function.

Mr. Patrick Wright
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V.

CONCLUSION

For the reasons herein stated, NCWA strongly urges EPA to avoid potential jurisdictional battles with the State of California by allowing the State to assume its rightful role in establishing water quality standards. If, however, EPA proceeds, it must make every effort to reconcile the standards with existing water rights granted under State law.

Sincerely,

A handwritten signature in cursive script that reads "Richard K. Golb". The signature is written in dark ink and is positioned below the word "Sincerely,".

Richard K. Golb

cc: Sandra K. Dunn